BOOK REVIEWS

Plants of the Vicinity of New York¹

This long awaited publication by Dr. Gleason was planned to enable the person who knows nothing whatever of botany to determine in a few minutes' time the name of any flowering plant or fern growing wild in the vicinity of New York. Except for a few rare species, it will serve well for all the region within two hundred miles of New York.

It has long been felt that the treatments of flowering plants given in current manuals are far too difficult for the beginner. Here, then, is a book which entirely avoids such pitfalls as the number of cells in the ovary, or the attachment of ovules—characters which are stumbling blocks even for the professional botanist whenever material not in the best of condition is offered for identification. This compact and neat book of 284 pages, fitting readily into the pocket, succeeds admirably in its purpose, and it is a surprise and a delight to see people who have never even heard of a pistil or a stamen, after a few minutes' reading of the introductory paragraphs, go ahead and identify accurately the specimen at hand.

The first part of the publication consists of an introduction to the structure of plants, taking up in a very simple manner the leaf, its arrangement on the stem, and its variation from simple to compound forms. A brief discussion of shapes of leaves follows, the principal forms and necessary details being lucidly shown by drawings. The parts of a typical flower and the kinds of inflorescence are likewise briefly described and illustrated. In all, nineteen items are treated in these fourteen pages of introduction, including two paragraphs on "names of plants." The introduction is followed by a simple glossary (a little less than three pages) which is characterized by such fresh and vivid elucidations as "Ellipsoid. Shaped like a football." "Obovoid. Shaped like an egg upside down." "Stolon. A leafy basal horizontal stem which eventually takes root and becomes an independent plant."

¹ Gleason, H. A. Plants of the Vicinity of New York. lxxxvi+198 pages. New York Botanical Garden, 1935. Price \$1.65.

Except for a general index, the rest of the book consists of keys to the plants of the New York region, with three pages of introduction on "How to Use the Book."

In the preliminary key to the groups—the arrangement surprisingly resembles that of the Medieval botanists who had eyes only and no microscopes—we have six groups as follows: woody plants, vines, aquatic plants, ferns and their allies, herbaceous monocotyledons, herbaceous dicotyledons, and unusual plants. The group of "unusual plants" includes such oddities as cactus, Indian pipe, horsetails, *Lobelia Dortmanna*, *Hudsonia*, asparagus, etc. These leading groups key directly into the single systematic treatment of families, genera, and species which forms the backbone of the book, and to which all paths lead. Here again we have clear line drawings of diagnostic features in groups which would otherwise remain beyond the comprehension of the beginner, despite any key written in words.

It is a relief to find common names that are actually in use. In the absence of an established common name, the general name of the group is employed for each individual species, thus we find that there are fourteen species of "Bedstraw," twentyseven "Violets," and the species of many other genera are in similar large proportions. The fact that the common name can be reached in practically all cases without the need of consulting the scientific name will endear this little volume to many of the "thousands of Boy Scouts, hikers, campers, tourists, and gardeners" for which it was planned. The inclusion of all species growing wild in the New York area except for a few technical groups is sufficient indication that the work is not of a superficial character. No single botanist has ever found all the plants mentioned. The reviewer, in going over the book, discovered that there was a total of 255 species which he had never seen growing wild in the New York area, and of this number 140 have never been seen or collected by him anywhere in northeastern United States or Canada. The large majority of these are casual waifs found now and then in cultivated fields or escaped from gardens, but there are some, such as Obolaria, A plectrum hyemale, Cypripedium candidum, and Pogonia divaricata, which are of great rarity, and have been seen by very few botanists.

There are a few plants growing in the New York area that

one feels might have been included, such as the different varieties of the spinulose shield fern which often have the appearance of distinct species, the purple cliff brake (Pellaea atropurpurea), Lycopodium annotinum, Oakesia puberula, Betula papyrifera, Ranunculus fascicularis, Hepatica acutiloba, Dicentra canadensis and Viola latiuscula; also the weedy introductions, Linaria minor, Chenopodium Botrys, and Cycloloma atriplicifolium which are not infrequent in the vicinity of New York.

This little volume should do much to arouse the interest of the general public as well as the botanical student in our native plants and in systematic botany. A highly successful future for it is predicted.

H. K. Svenson

BROOKLYN BOTANIC GARDEN

Plants of Southern California²

In his Manual of Southern California Botany, Dr. Munz has rendered a distinct service to all botanists interested in the plants of the region. The area covered is roughly the southern one-fourth of the state, the northern boundary running through Ventura, Kern and Invo counties, including all of Death Valley, the other boundaries being those of the state. For this region all of the ferns and flowering plants are described and many are illustrated with line drawings. Keys to families, genera and species are complete. Covering a restricted region, the keys are simpler and shorter and localities are listed in more detail than is possible in a work covering the entire state. Comparing the volume with Jepson's Manual of the Plants of California it is noted that for many of the larger genera less than half as many species are included. Thus 31 species of Lupinus are given for Southern California, 65 for the state; for Trifolium the numbers are 16 and 41; for Brodiaea, 8 and 21; for Potentilla, 20 and 44; for Calochortus, 16 and 24; and for Carex, 41 and 126. As the region covered covers the desert regions of the state all of the species of Cactaceae, Yucca, Agave and most of the succulents are included. In the Crassulaceae there is noted a feature in which both of the manuals migh have been improved —the use of synonyms. Jepson describes eight species of

² Philip A. Munz. A Manual of Southern California Botany. (8) XXXIX +642 pages. Claremont College, 1935. \$5.00.